

### **AMENDMENTS TO THE CLAIMS:**

The listing of claims will replace all prior versions, and listings of claims in the application:

### **LISTING OF THE CLAIMS**

1. (Original) A method of eliciting a Raman signal from a living cell, or a plurality of living cells, said method comprising irradiating the cell with a laser having a wavelength of  $785 \pm 60$  nm.
2. (Original) A method according to claim 1 comprising irradiating the cell with a laser having a wavelength of  $785 \pm 20$  nm.
3. (Previously presented) A method according to claim 1 wherein the cell is exposed to a total energy of at least about 20 Joules.
4. (Previously presented) A method according to claim 1 wherein the cell is exposed to a total energy of at least about 100 Joules.
5. (Previously presented) A method according to claim 1 wherein the cell is exposed to a total energy of at least about 200 Joules.
6. (Previously presented) A method according to claim 1 wherein the cell is exposed to a total energy of at least 275 Joules.
7. (Previously presented) A method according to claim 1 wherein the cell is irradiated at an intensity of  $115 \pm 50$  mW.
8. (Previously presented) A method according to claim 1 wherein the cell is irradiated at an intensity of  $120 \pm 60$  mW.
9. (Previously presented) A method according to claim 1 wherein the cell is irradiated for a period of up to 40 minutes.

10. (Previously presented) A method according to claim 1 wherein the laser is focussed within the cytoplasm of the cell.

11. (Previously presented) A method according to claim 1 wherein the laser is focussed within the nucleus of the cell.

12. (Previously presented) A method according to claim 1 wherein the laser is focussed within the extracellular matrix.

13. (Previously presented) A method according to claim 1 wherein the cell is cultured on a bioinert material.

14. (Original) A method according to claim 13 wherein the bioinert material is poly-L-lysine coated fused silica.

15. (Previously presented) A method according to claim 1 wherein the cell is cultured on a bioactive scaffold.

16. (Previously presented) A method according to claim 1 wherein the cell is cultured on an uncoated bioactive glass or a sol-gel derived gel glass.

17. (Currently amended) A method of detecting changes in a living cell or a plurality of living cells, said method comprising the steps of:

- (i) eliciting a Raman signal in accordance with ~~any one of claims 1 to 16~~ claim 1; and
- (ii) measuring changes in the Raman signal over a period of time.

18. (Previously presented) A method according to claim 17 for detecting changes in one of the cell phenotype, induced by a pharmaceutical agent or a cytotoxic agent, protein levels, DNA or RNA levels, the extracellular matrix, the cell cycle.

19. (Original) A method according to claim 17 for monitoring cell growth.

- 20. (Canceled)
- 21. (Canceled)
- 22. (Canceled)
- 23. (Canceled)
- 24. (Previously presented) A method according to claim 17 for detecting the cell cycle of a living cell.
- 25. (Canceled)
- 26. (Previously presented) A method according to-claim 17 for detecting the onset of cell death by apoptosis or necrosis.
- 27. (Canceled)
- 28. (Canceled)
- 29. (Canceled)